

AAAAI Ask the Expert

Baked Milk Challenges

Q: I was looking for some guidelines regarding Baked Milk Challenges. Is there a limit to their CAP-RAST levels to be considered for this testing. Her mother states that she had an anaphylaxis to milk ingestion in the past and does also have a contact reaction when milk touches her skin. Thank you for any research information you can provide.

A: Thank you for your recent inquiry.

I am asking Dr. Anna Nowak-Wegrzyn, who is an internationally known expert in food allergy, especially food allergy to milk, and who has done a great deal of work in research in this area, to respond to your inquiry. As soon as I hear back from Dr. Nowak-Wegrzyn, we will forward her response to you.

Thank you again for your inquiry.

Sincerely,
Phil Lieberman, M.D.

Response from Dr. Nowak-Wegrzyn:

Based on our experience with 100 children with milk allergy we evaluated in our original baked milk study, we chose to exclude children with serum cow milk-IgE greater than 35 kUA/L because most [although not all] of the children with levels higher than 35 kUA/L reacted to baked milk and they tended to have more severe reactions during the baked milk challenge. We also excluded children who had life-threatening anaphylaxis to milk within past 2 years or reported a convincing allergic reaction [i.e., immediate symptoms within minutes to 1 hour of ingesting the food such as hives, angioedema, rhinorrhea, wheezing, cough, SOB, emesis, diarrhea] to small amount of baked milk in the past 6 months. We did not have exclusion criterion based on the size of the wheal of the prick skin test.

In the outpatient challenge, I would be even more careful and would choose a more conservative cut off; eg. cow milk IgE<5 or CM skin prick test wheal <8-9 mm. Please see the below articles.

Dietary baked milk accelerates the resolution of cow's milk allergy in children

Tolerance to extensively heated milk in children with cow's milk allergy

Kind regards,
Anna Nowak-Wegrzyn, MD
Associate Professor of Pediatrics
Division of Allergy and Immunology
Jaffe Food Allergy Institute
Mount Sinai School of Medicine